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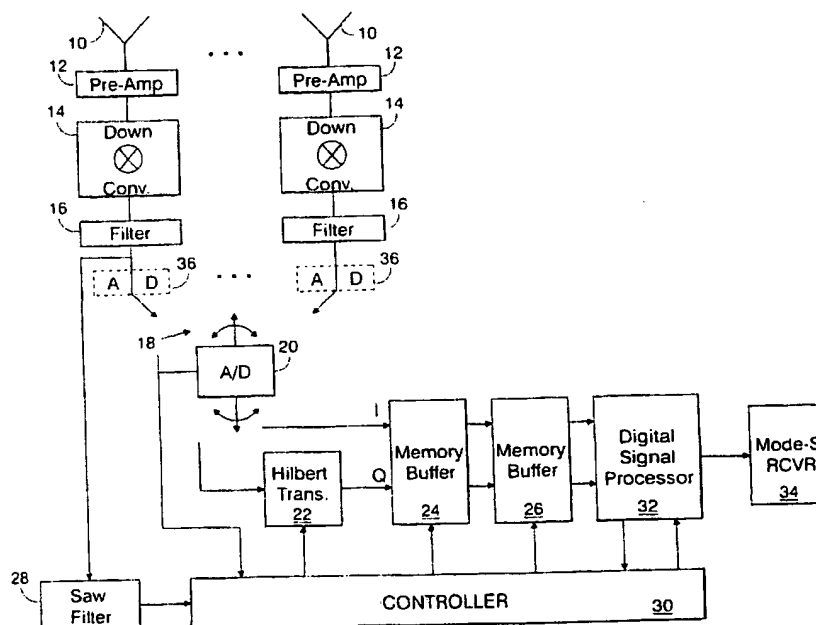
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[Continued on next page]

(54) Title: **DIGITAL RECEIVING SYSTEM FOR DENSE ENVIRONMENT OF AIRCRAFT**



(57) Abstract: The capacity of a Mode-S ADS-B surveillance radar system is increased by sectorizing the radar system by the use of a directional array of Mode-S, quarter wavelength, single element, stub antennas. The ensemble of signals from the array of Mode-S antenna elements is processed electronically. The signal processing/receiver architecture increases the capacity of the



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For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.

INTERNATIONAL SEARCH REPORT

International Application No.

PLT/US 01/21889

A. CLASSIFICATION OF SUBJECT MATTER

IPC 7 G01S13/93 G01S13/76

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC 7 G01S H04B

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

EPO-Internal, WPI Data, PAJ, INSPEC

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	US 5 363 109 A (HOEFGEN GUENTER ET AL) 8 November 1994 (1994-11-08) column 6, line 9 -column 7, line 5 figure 3 ---	1-15
A	US 5 570 095 A (DROUILHET JR PAUL R ET AL) 29 October 1996 (1996-10-29) abstract column 1, line 59 -column 2, line 36 column 3, line 25-54 column 3, line 63 -column 4, line 55 figures 1-3 ---	1-15
A	US 5 191 349 A (DINSMORE BRUCE E ET AL) 2 March 1993 (1993-03-02) abstract column 1, line 56 -column 2, line 9 column 2, line 54 -column 3, line 16 --- -/--	1-15



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Patent family members are listed in annex.

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Date of the actual completion of the international search

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Name and mailing address of the ISA

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C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT

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A	ORLANDO V A ET AL: "GPS-SQUITTER: SYSTEM CONCEPT, PERFORMANCE, AND DEVELOPMENT PROGRAM" THE LINCOLN LABORATORY JOURNAL, NEW YORK, NY, US, vol. 7, no. 2, 1994, pages 271-294, XP000864105 the whole document	1-15

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INTERNATIONAL SEARCH REPORT

Information on patent family members

International Application No

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